REMARKS

With the entry of the foregoing amendments, claims 19-30 are pending in this application. Favorable reconsideration is requested.

The claims have been amended to place them in more conventional U.S. patent claim format and as supported by the specification, for example, page 4, line 5 through page 5, line 19. No new matter has been added.

At the outset, the applicant thanks the Examiner for the withdrawal of the previous prior art rejections. As discussed below, the new prior art rejection should also be withdrawn.

On pages 3-4 of the Office Action, claims 19-30 stand rejected as allegedly being obvious over Marshall (USP 5,275,646) in view of Codos (USP 6,467,898). Applicant traverses this rejection for at least the following reasons.

The primary reference by itself or in any reasonably apparent combination with the secondary reference does not disclose or suggest at least the following claim features individually or in applicant's particular combination:

19. A method of producing a digital printing ink, comprising the steps:

dispersing sublimatible coloring agents in a mixture of oligomers and monomers with a maximum particle size of 1 micron;

subsequently diluting the mixture of oligomers and monomers comprising the dispersed sublimatible coloring agents with a mixture of monofunctional and multifunctional acrylic monomers until a viscosity of between 10 and 30 centipoises, measured at 25°C, is obtained;

subsequently introducing a photoinitiator system, which causes the polymerization of the oligomers and monomers from the first step, in the presence of radiation;

...

producing a polymer that sets the dispersing sublimatible coloring agents on the media.

The foregoing claim elements are critical to the inventions claimed in the application and are not disclosed or suggested by the prior art. Moreover, the claims specifically set forth a sequence of steps that are not disclosed or suggested by the cited art.

The primary reference (Marshall) is directed to specific ink compositions that are different than applicant's claimed compositions and are not produced according to applicant's claimed methods. Aside from the differences in the compositions, Marshall teaches methods of ink production that do not disclose or suggest the specific features or series of steps as claimed by the applicant. In this regard, Marshall is directed to: (1) an inventive ink composition that comprises a polar conductive component (unlike the claimed method or ink invention), and (2) an ink composition that does not have a conductive component (and which is also unlike the claimed method or ink invention). Neither of these Marshall ink compositions are prepared utilizing the claimed method (see claim 19) that requires, among other things:

the use of a sublimatible coloring agent,

the sublimatible coloring agent's dispersion in a mixture of oligomers and monomers in a first step,

subsequently diluting that mixture of oligomers and monomers which includes the dispersed sublimatible coloring agents with a mixture of monofunctional and multifunctional acrylic monomers,

subsequently introducing a photoinitiator system that causes the polymerization of the oligomers and monomers from the first step,

...

producing a polymer that sets the dispersing sublimatible coloring agents on the media.

Thus, Marshall does not disclose or teach the foregoing claim features or the claimed ink resulting from applicant's claimed method.

It is also important to note that Marshall itself confirms that ink compositions and the methods of producing ink compositions involve unpredictable and complex technology. See, for example, column 1, lines 13-14 of Marshall. Thus, any modifications to the compositions or the methods disclosed in Marshall may not lead to viable ink compositions or methods of producing viable ink compositions.

The secondary reference (Codos) does not overcome the numerous deficiencies of Marshall. Codos simply suggests a method and apparatus for ink jet printing on textiles involving the critical use of partial curing and then heating. Codos does not disclose or suggest any method for producing ink. Thus, one skilled in the art would not cherry pick any particular ingredient from Codos and then insert it into the methods disclosed in Marshall. And, even if one skilled in the art did so, it would not lead to the claimed invention.

Indeed, Codos does not disclose the critical method steps in claim 19 or the sequence of those steps (as set forth above) -- and Marshall certainly does not disclose those particular claim

steps or sequence of steps (as discussed above). For example, Codos does not disclose or teach when or where to employ the use of coloring agents in a method for producing inks.

Moreover, the addition of a Codos component into the Marshall method is not guaranteed to result in a viable ink composition due to the unpredictable and complex nature of ink composition technology and ink production method technology.

For at least the foregoing reasons, applicant submits that Marshall's teachings combined in any reasonably apparent fashion with the teachings of Codos (as required by the Supreme Court in *KSR*) would not result in the claimed invention. Thus, applicant requests the withdrawal of the obviousness rejection.

Applicant submits that the application is in condition for allowance and earnestly solicits a notice to that effect. If the Examiner has any questions concerning this application, the undersigned can be contacted at 703-816-4009.

Respectfully submitted,

NIXON & VANDERHYE P.C.

By: _____

Duane M. Byers
Reg. No. 33,363

DMB:lfo
901 North Glebe Road, 11th Floor
Arlington, VA 22203-1808
Telephone: (703) 816-4000
Facsimile: (703) 816-4100